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ABSTRACT

This study was conducted to determine whether differences exist between the perceptions of constituent groups concerning what a teacher must do to produce student success in the classroom. Specifically, three research questions were addressed: (1) do preservice teachers, inservice teachers, school administrators, and college professors differ in their perceptions of effective teacher characteristics? (2) do males and females differ in their perceptions of effective teacher characteristics? and (3) will there be an interaction between group membership and gender related to perceptions of effective teaching characteristics? A survey instrument, the Perceptions of Teacher Influence, was administered to preservice teachers (N=349), inservice teachers (N=253), school administrators (N=123), and college professors (N=39). Results indicated a significant groups-by-gender interaction for three variables (matching instruction to each student's abilities, teaching students to think for themselves, and showing enthusiasm when teaching). Interaction patterns revealed that females across groups responded similarly, and at a higher level than males, to each variable; administrators were the most similar in their responses; and professors exhibited the most difference in gender perceptions. (Contains 26 references.) (LL)

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Effects of Gender on Perceptions of Teacher Influence

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Effects of Gender on Perceptions of Teacher Influence

Abstract

Perceptions of teacher influence on student success was examined based on the responses of four groups (i.e., preservice teachers, inservice teachers, school administrators, and university professors). The extent to which gender was related to perceptions was examined, also. A total of 764 educators responded to the Perceptions of Teacher Influence instrument.

Results of the two-way, groups-by-gender, multivariate analysis indicated significant ($p < .001$) main effects for both group and gender variables and a significant ($p < .001$) interaction effect. Based on the Wilkes Lambda test of significance two cannonical dimensions made significant ($p < .001$) contributions to the interaction. Examination of the univariate results indicated that three variables (i.e., match instruction to each student's abilities, teach students to think for themselves, and show enthusiasm when teaching) made significant contributions to the interaction. In general, females tended to respond similarly to selected variables and to rate variables at a higher level than did males. Administrators, regardless of gender, were the most similar in their responses.

Effects of Gender on Perceptions of Teacher Influence

Introduction

Researchers have found that the beliefs and perceptions held by individuals are strong indicators of the decisions they make throughout their lives (Bandura, 1986; Nisbett & Ross, 1980; Rokeach, 1968). Based on the work of these researchers, one may assume that the perceptions educators have about teacher characteristics associated with student success are likely to influence their behaviors in educational settings (Fenstermacher, 1979; Pintrich, 1990). However, few studies have examined educators' beliefs and perceptions (Clark & Peterson, 1986; Nespor, 1987), and no studies have been located which investigated the effects of gender on educators' perceptions of teacher characteristics asociated with student success.

The major purpose of this study was to determine whether differences exist between the perceptions of constituent groups concerning what a teacher must do to produce student success in the classroom. Specifically, the three research questions addressed were:

1) Do preservice teachers, inservice teachers, school administrators, and college professors differ in their perceptions of effective teacher characteristics?

2) Do males and females differ in their perceptions of effective teacher characteristics?

3) Will there be an interaction between group membership and gender related to perceptions of effective teaching characteristics?

Methodology

Sample

The sample included 764 educators from a university and two school districts located in southeast Mississippi, representing four groups: preservice teachers (n=349), inservice teachers (n=253), school administrators (n=123), and college professors (n=39). The preservice teachers included undergraduates preparing for certification in one of three areas, elementary education (n=213), secondary education (n=82), or a special area such as

English education, special education, science education, etc. (n=54). The preservice teachers represented three levels of progress in the teacher education program: second-semester sophomores who had not been formally admitted to teacher education (n=65); second-semester juniors who were enrolled in methods courses in education (n=107); and seniors who had completed eight weeks of student teaching (n=177).

The inservice teachers (approximately 68% of whom are Caucasian and approximately 32% of whom are African American) included elementary (n=92), secondary (n=105), and assistant teachers (n=56). The inservice teachers were teaching in a school district whose student population was predominantly African American (74% African American, 26% Caucasian) or a school district whose student population was predominantly Caucasian (90% Caucasian, 10% African American).

The school administrators included elementary principals (n=40), secondary principals (n=35), and superintendents (n=48). The school administrators were randomly selected from a list of all the public school administrators employed in the State of Mississippi.

The college professors (n=39) were from a single university and included those professors who teach undergraduate students seeking certification in elementary education, secondary education, or a special area.

Instrumentation

The Perceptions of Teacher Influence (PTI) was used to survey the sample. The PTI, which was developed by the authors, consists of three sections: (1) a list of 16 teacher characteristics, each of which is rated by the respondent (using a six-point, Likert-scale ranging from essential to not essential) to indicate his/her belief about the degree of its importance in producing student success in elementary and secondary classrooms; (2) an opportunity to select and rank order three teacher characteristics that the respondent believes are the most important, followed by a brief written description of the evidence that could be used (for each selected characteristic) to indicate that a teacher possesses the designated

characteristic [also, space is provided on the instrument where the respondent may write additional charactertistics that he/she believes are important]; and (3) a request for demographic information related to group membership (e.g., preservice teacher, school administrator, etc.), age, and gender of respondent. The PTI may be administered in a group setting; approximately 12-15 minutes are required to respond to the PTI. Responses on the first section of the PTI (i.e., the section containing 16 descriptive characteristics of classroom teachers) should be analyzed by item rather than as a group of items. A copy of the PTI is appended.

The list of 16 teacher characteristics contained in the first section of the PTI was compiled after considering several sources of information: items suggested by classroom teachers and school administrators; items listed on personnel reference forms used by school districts; items listed on teacher evaluation forms, such as the Mississippi Teacher Assessment Instrument (MTAI); areas included in standards for undergraduate and graduate teacher education set by professional organizations, such as the National Council of Teachers of Mathematics (NCTM), the International Reading Association, (IRA), the National Council for the Accreditation of Teacher Education (NCATE); and the findings of relevant research studies. The 16 items contained in the PTI and the specific references supporting inclusion of each item are as follows:

1. know the subject matter throughly (McEwan & Bull, 1991; Reynolds, 1992; Stein, Baxter, & Leinhardt, 1990)
2. manage (discipline) students effectively (Glasser,1990; Kagan, 1992; Reynolds, 1992)
3. motivate students (Harari & Covington, 1981; Reynolds, 1992; Stodolsky, Salk, & Glaessner, 1991)
4. appreciate cultural diversity among students (Cazden & Mehan, 1989; Grossman, 1992; Reynolds, 1992)
5. follow district/state curricular guides (Blase, 1990; Stodolsky, Salk, & Glaessner, 1991)
6. use appropriate written and spoken language (Pajares, 1992)

7. work cooperatively with school personnel (Blase, 1990; Leithwood & Montgomery, 1982)
8. complete assigned responsibilities on time (personnel reference forms; suggested by teachers and school administrators)
9. be willing to work beyond regular school hours (Blase, 1990)
10. foster positive self-esteem in students (suggested by teachers and school administrators)
11. have received good grades in college (personnel reference forms)
12. possess self-confidence (Brookhart & Freeman, 1992; Pajares, 1992; Reynolds, 1992)
13. match instruction to each student's abilities (Blase, 1990; Leithwood & Montgomery, 1982; McEwen & Bull, 1991; Reynolds, 1992; Stodolsky, Salk, & Glaessner, 1991)
14. present subject matter in an interesting way (Harari & Covington, 1981; McEwen & Bull, 1991; Stodolsky, Salk, & Glaessner, 1991)
15. teach students to think for themselves (Harari & Covington, 1981; Leithwood & Montgomery, 1982)
16. show enthusiasm when teaching (Aubrecht, Hanna, & Hoyt, 1986; Harari & Covington, 1981)

The PTI was pilot tested using a sample of 49 classroom teachers and shool administrators (36 females and 21 males), who responded to the instrument and suggested ways to improve it. Their suggestions were incorporated into the instrument.

Procedures

After developing the PTI instrument, two sets of written directions for administering the PTI were developed: (a) a set to be used when administering the PTI to preservice teachers; and (b) a set to be used when administering the PTI to inservice teachers. Also, a letter was composed to accompany the PTI instrument being mailed to university professors and to school administrators; the letter explained the purpose of the study and requested that the PTI be completed and returned in an enclosed, stamped and self-

addressed envelope by a specific date (approximately two weeks after its receipt by the respondent).

Using a single university, the names and addresses of all professors who teach undergraduate students seeking certification in elementary education, secondary education, or a special area were compiled. The letter of explanation, the PTI instrument, and a return envelope was mailed to each of the professors.

A list of all the public school administrators employed in the State of Mississippi was obtained. Using a table of random numbers, 200 school administrators (100 principals and 100 superintendents) were randomly selected from the list. The letter of explanation, the PTI instrument, and the return envelope was mailed to each of the administrators.

The authors collected responses from preservice teachers and inservice teachers by meeting with them in groups and asking them to respond to the PTI. The last 20 minutes of designated class sessions were used to obtain responses from preservice teachers who were enrolled in selected courses required for a bachelor's degree in education. After receiving permission from two school superintendents to administer the PTI to teachers employed in their school district, responses from inservice teachers were collected during the first 20 minutes of staff development workshops being held at the school sites.

All responses to the PTI were obtained during the month of March.

Results

Responses on a total of 733 instruments were included in the analyses, after excluding instruments with missing information. Data obtained from responses to the 16 teacher characteristics (section one of the PTI) were analyzed using a two-way (groups by gender) multivariate analysis. Both main effects were significant ($p < .001$) as was the groups-by-gender interaction ($p < .001$), based on the Wilkes Lambda test of significance (Table 1). Two cannonical dimensions associated with the interaction were significant ($p < .001$).

Examination of the univariate results indicated significant

contributions for variables 13 ($p < .04$), 15 ($p < .01$), and 16 ($p < .03$). The univariate F-ratios, raw and standardized canonical coefficients, and structure coefficients are presented in Table 2. Figures 1 - 3 display the interaction patterns for variables 13, 15, and 16.

Discussion

Results of the multivariate analysis indicated a significant groups-by-gender interaction. Based on the univariate analyses, significant groups-by-gender interactions were found for three varibles (items 13 [match instruction to each student's abilities], 15 [teach students to think for themselves], and 16 [show enthusiasm when teaching]). Examination of the interaction patterns indicated that females across groups basically responded similarly, and at a higher level, than males on each variable; however, on variable 16 female administrators responded slightly lower than male administrators. Since the three variables deal with the teacher/student interactive process, a possible explanation for the higher ratings by females may be that a larger proportion of the females in this study had elementary teaching experience in self-contained classrooms. Self-contained classrooms tend to be more child-centered and individualized. Following this interpretation, males are more likely to have secondary teaching experience where the emphasis is on subject-matter transmission. Another factor affecting this may be that the females had more classroom teaching experience than did the males. More research is needed to determine the extent to which amount and level of teaching experince influences perceptions of teaching characteristics associated with student success.

It was not suprising to find that male and female administrators were more alike in their responses (differing less than .15 of a point) than were the other groups. This may be a personality/ideology orientation that leads similar personality types into choosing an administrative career. Another possibility could be the social influence of administrative peers on one another's views. Both personality/ideology orientation and social influence were offered by Marlene Kramer (1974) as possible explanations of why nurses

leave the nursing profession; these same two factors may explain why the responses of male and female administrators, across variables (items), were more alike than were the responses of males and females in the other groups.

In direct contrast to the finding that male and female administrators were similar in thier responses, it was found that male and female professors differed. When comparing all of the groups by gender, the female professors rated the three significant variables (match instruction to each student's abilities, teach students to think for themselves, and show enthusiasm when teaching) much higher than the males. It may be that professors, as a group, move into the university setting because the public school setting expects teachers to think similarly about educational matters; whereas, the university setting is more conducive to independent, diverse thought about educational matters resulting in the emergence of gender differences in perceptions among professors.

From an overall viewpoint, there appears to be a decrease in the extent to which the genders differ in their perceptions as they move from preservice training to classroom teaching. Very minor gender differences appear to exist for administrators in the schools. Future research should examine the degree to which social and experiential processes may affect this phenomena.

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of school problems. American Educational Research Journal, 18,(1), 29-37.

Table 1

Summary of MANOVA Analysis

Source	df	F	p
Group	48/2113	3.72	<.001
Gender	16/ 710	5.03	<.001
G X G	48/2113	1.88	<.001

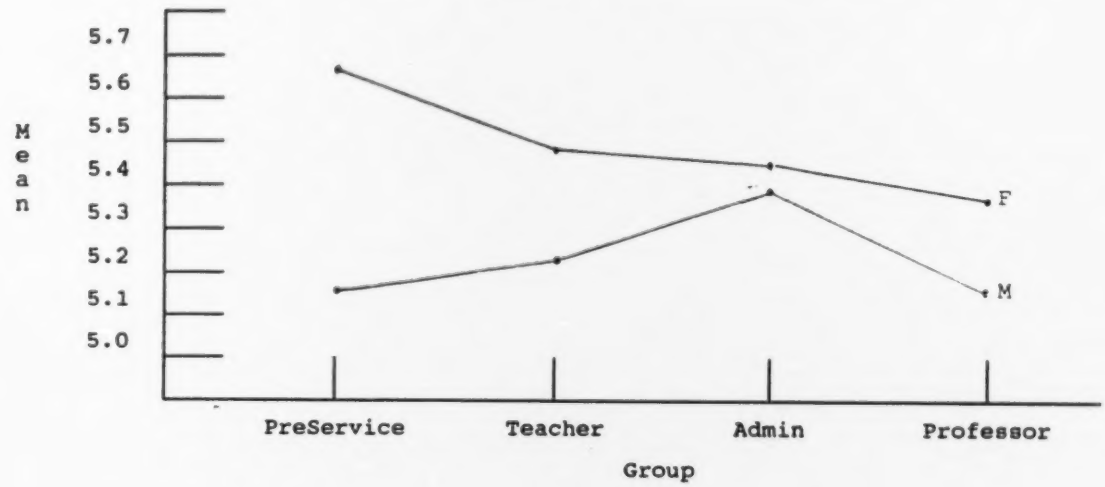
Table 2

Summary of the Multivariate and Univariate Statistics for the Groups-by-Gender Interactions

Variable	F	p	Coefficients					
			Raw		Standard		Structure	
			I	II	I	II	I	II
Item 1	1.80	.147	.59	.27	.30	.14	.30	.05
Item 2	2.58	.052	.27	-1.02	.14	-.52	.26	-.37
Item 3	1.38	.246	.09	-1.22	.04	-.57	.10	-.27
Item 4	0.36	.780	-.31	.35	-.26	.30	-.07	.19
Item 5	2.18	.089	-.47	-.29	-.46	-.28	-.30	-.18
Item 6	2.55	.054	.67	.21	.37	.11	.38	.05
Item 7	1.19	.311	.26	-.02	.19	-.01	.14	-.07
Item 8	0.44	.722	-.51	-.26	-.38	-.20	-.11	-.07
Item 9	2.16	.091	.27	-.01	.27	-.01	.29	.11
Item 10	1.13	.337	.15	-.16	.07	-.07	.19	-.01
Item 11	1.09	.351	.05	.34	.05	.36	.03	.33
Item 12	2.22	.085	.34	-.15	.22	-.10	.31	.06
Item 13	2.88	.035	-.18	.24	-.12	.16	.01	.24
Item 14	1.69	.167	-.84	.73	-.45	.39	-.08	.40
Item 15	4.47	.004	1.28	.01	.62	.01	.49	.19
Item 16	3.15	.025	.08	1.12	.03	.48	.18	.46

Figure 1

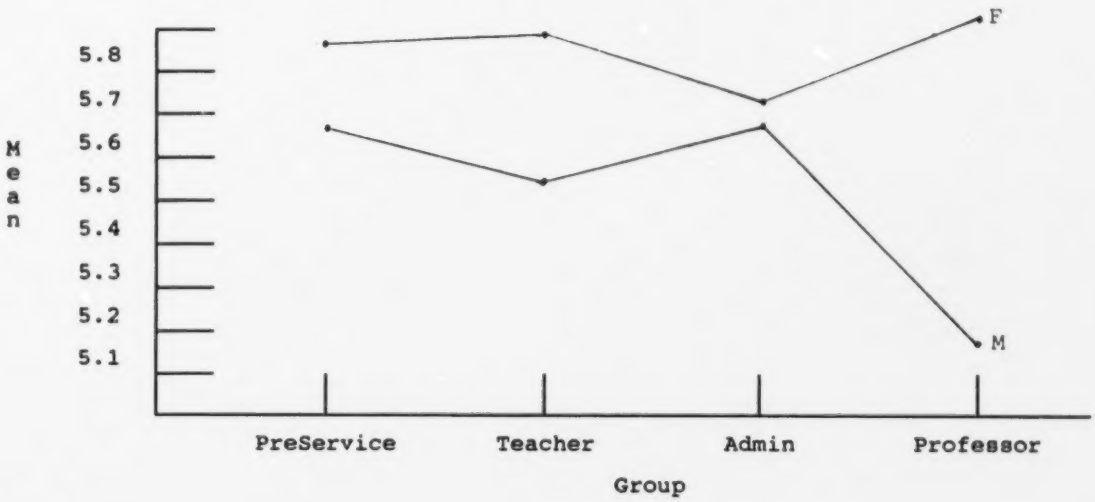
Variable 13: match instruction to each student's abilities



CELL MEANS -	Preservice	Teacher	Admin	Professor
Female:	5.67	5.47	5.43	5.35
Male:	5.13	5.21	5.39	5.13

Figure 2

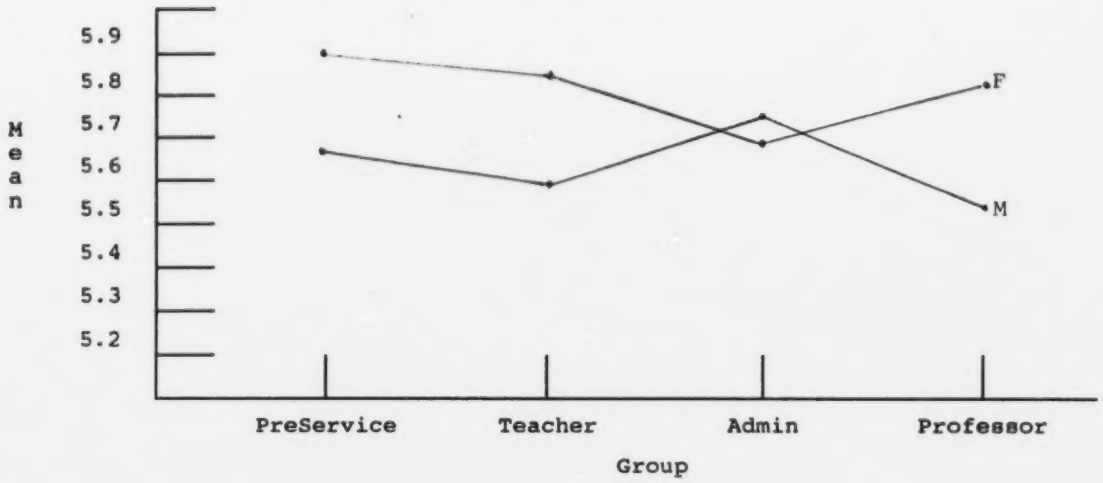
Variable 15: teach students to think for themselves



CELL MEANS -	Preservice	Teacher	Admin	Professor
Female:	5.84	5.86	5.71	5.88
Male:	5.65	5.52	5.66	5.16

Figure 3

Variable 16: show enthusiasm when teaching



CELL MEANS -	Preservice	Teacher	Admin	Professor
Female:	5.89	5.83	5.68	5.82
Male:	5.65	5.58	5.74	5.53